



**DEPARTMENT OF THE ARMY**  
**OFFICE OF THE ASSISTANT SECRETARY**  
**CIVIL WORKS**  
**108 ARMY PENTAGON**  
**WASHINGTON DC 20310-0108**

REPLY TO  
ATTENTION OF

26 OCT 2001

The Honorable Mitchell E. Daniels, Jr.  
Director  
Office of Management and Budget  
Eisenhower Executive Office Building  
Washington, D.C. 20503

Dear Mr. Daniels:

I am responding to your October 3, 2001, letter to Secretary White regarding the Army Corps of Engineers general reevaluation report that recommends implementation of the authorized \$127 million multi-purpose project in Dallas, Texas. The project is referred to as the Dallas Floodway Extension (DFE) Project. I am of the firm opinion that the Corps followed the Federal Principles and Guidelines and formulated a technically sound, economically justified, and environmentally and socially acceptable project. Let me briefly explain the reasons for this position.

Over the last ten years the Corps has worked closely with the City of Dallas, the public, environmental groups (both proponents and opponents) and other agencies to develop an acceptable solution to the severe flooding problems in the unprotected area south of the Dallas central business district (CBD). A project to resolve the flooding problem in this area was authorized for construction by the Congress in 1965 but never was implemented. In response to severe flooding in 1989 and 1990, a reevaluation of the uncompleted downstream project began in 1991. Flood damages in this downstream area occur more frequently than about once every five years, whereas the CBD currently has about a 300-year level of protection.

The reevaluation study investigated an extensive array of alternatives, both structural and nonstructural. In accordance with the Federal Principles and Guidelines the plan formulation process did not focus entirely on economics. While the recommended plan displays lower net benefits than might be realized if the only focus were on economics, it achieves a variety of other objectives that would not be realized if it were formulated just to maximize economic returns. Significant improvements were made to the most economically efficient plan to address environmental and social concerns, avoid adverse impacts, and provide for ecosystem restoration. As required by the Federal Principles and Guidelines, the authorized multi-purpose DFE project is complete, acceptable, effective and efficient, and solves flooding problems in a manner that is consistent with protecting the Nation's environment.

During the plan formulation process, the public clearly expressed strong opposition to increasing protection to downtown Dallas at the expense of continued flooding in the downstream communities and businesses. Your proposed plan to raise the existing Dallas Floodway East Levee protecting the CBD, construct the downstream Chain of Wetlands, and buy out homes in the Cadillac Heights area is not implementable, nor are all the features of the proposal economically justified. Specifically, the purchase of homes in Cadillac Heights is not economically justified and is not supported by the local sponsor. If the buyout were limited, as you suggest, to the purchase of homes on a willing sellers basis, the remaining homes and businesses would continue to be subject to frequent flooding and damage. Moreover, the cost of evacuating all the structures in the Cadillac Heights area is more costly than the levee proposed in the DFE project. Finally, the proposal to raise the Dallas east levee in lieu of the DFE project continues to leave the Lamar Street area subject to flooding.

Detailed responses to the key concerns noted in your letter are enclosed (Enclosure 1). I am also including three information papers (Enclosures 2, 3 & 4) that were previously furnished to your office. These provide further insight into the plan formulation process, the non-structural buyout alternatives in the Cadillac Heights area, and the detailed follow-on systems analysis undertaken by the Corps. This systems analysis demonstrates that the most appropriate solution to solving the overall flooding problems in the Dallas area is by constructing the DFE project, as currently formulated, followed by any additional future upstream improvements which may be incrementally justified. Upstream improvements to the existing Dallas floodway levees are being investigated under the ongoing feasibility study for the Upper Trinity River.

In conclusion, I believe the Corps followed the Federal Principles and Guidelines and developed a project that is technically sound, economically justified, environmentally and socially acceptable, and in the Federal interest. I urge you to reconsider your position and join the citizens of Dallas and the Congress in supporting construction of the Dallas Floodway Extension Project.

A handwritten signature in black ink, appearing to read 'Mike Parker', with a long horizontal flourish extending to the right.

Mike Parker  
Assistant Secretary of the Army  
(Civil Works)

Enclosures

## **Point-by-Point Response to OMB letter dated October 3, 2001**

1. *"...the Corps must evaluate all reasonable alternatives and their impacts, and must identify the option with the greatest net economic benefits consistent with protecting the Nation's environment. Based on our review, the Corps has not done so in this case..."*

Contrary to the Office of Management and Budget (OMB) assertion, the Army Corps of Engineers followed the Principles and Guidelines (P&G), did consider all reasonable alternatives, and did identify the National Economic Development (NED) plan. The NED plan is a 1,200-foot-wide swale along the Trinity River. This plan has net annual economic benefits of about \$8.6 million (flood control benefits only). This plan has greater annual net benefits than the alternative suggested by OMB of raising the existing Dallas Floodway East Levee. As documented in the August 3, 2001, supplemental information paper raising the levee would most likely have net annual economic benefits of about \$5.3 million. The Corps planning process does not just focus on economic returns, but also considers adverse environmental and social impacts, and seeks opportunities to achieve other national water resources objectives. In this regard, the Corps, with strong community input, developed the Chain of Wetlands and levee plan that was recommended for construction. This plan provides for a more complete solution to the flooding problems than a single objective plan.

2. *"Without the protection that the project provides to downtown, both the total cost of the project and the cost of each of its major flood control features would exceed the benefits."*

It is appropriate to include flood damage reduction benefits in the CBD in the plan formulation and economic justification for the Dallas Floodway Extension project. The recommended project not only provides substantial flood protection to the unprotected area south of the Dallas Central Business District (CBD), but also lowers flood stages in the existing Dallas Floodway area, thereby benefiting that area as well. The suggested alternative of increasing the height of the existing Dallas Floodway East Levee would also reduce flood damages in the CBD, but since existing bridges and roads constrain a levee raise to a maximum of about 2 feet, benefits from a levee raise are more limited. The significant residual flood damages that would still occur with the levee raise can be reduced by the recommended downstream improvements. The OMB is correct that the alternative of raising the height of the Dallas Floodway East Levee was not evaluated in the original report. However, the August 3, 2001, supplemental information paper did evaluate this alternative and found that the recommended Dallas Floodway Extension project is economically justified even if the Dallas Floodway East Levee was first raised by 2 feet. That paper also shows the plan that results in the greatest net NED benefits is to construct the Dallas Floodway Extension project first, and then raise the Dallas Floodway East Levee.

## Point-by-Point Response (Continued)

3. *"...the report should have explored a range of options for reducing this flood risk together with those that would address downstream flooding concerns."*

Recognizing that the existing Dallas Floodway East Levee provide about a 300-year level of flood protection to the Central Business District (CBD), and that the area downstream of the CBD has no flood protection and is subject to floods that occur as frequently as one every five years, the Army Corps of Engineers did consider a full range of alternatives for reducing the most serious flood problems in the city of Dallas. The Corps planning process properly focused on evaluating solutions to the flood problems in the downstream, unprotected area. The plan formulation process for providing additional protection in the CBD is relatively straightforward -- raise the existing levee. The August 3, 2001, supplemental paper shows that the proper evaluation and construction sequence is to first provide protection to the unprotected downstream area and then to provide additional protection to the upstream CBD. All upstream options, are currently being evaluated as part of the Corps ongoing Upper Trinity River Feasibility Study.

4. *"...data suggested that the net economic benefits of a project that included raising the east levee could be high. However, the Corps elected not to evaluate this potentially promising approach in the report."*

The Army Corps of Engineers does not agree that raising the Dallas Floodway East Levee is a substitute for the Dallas Floodway Extension project. Raising the Dallas Floodway East Levee could increase the level of protection to Central Business District (CBD). This alternative is being evaluated as part of the ongoing Upper Trinity River Feasibility Study. However, the benefits to be realized by such a levee raise are limited. Existing bridges and roads in the CBD limit raise to a maximum of about 2 feet. With such a limited levee raise, there are still significant residual flood damages in the CBD that can be effectively reduced by the type of downstream improvements included in the Dallas Floodway Extension project. The OMB is correct that the alternative of raising the height of the Dallas Floodway East Levee was not evaluated in the original report. However, the August 3, 2001, supplemental information paper did evaluate this alternative and found that the recommended Dallas Floodway Extension project is economically justified even if the Dallas Floodway East Levee was first raised by 2 feet. That paper also shows the plan that results in the greatest net NED benefits is to construct the Dallas Floodway Extension project first, and then raise the Dallas Floodway East Levee.

5. *"The Corps' recent supplementary paper (dated August 3, 2001) confirms the need to develop one or more such alternatives prior to reaching a decision on whether to proceed with the proposed project."*

## Point-by-Point Response (Continued)

The primary focus of the Dallas Floodway Extension study was to reevaluate the project authorized by Congress in 1965 to protect the area immediately downstream of the Dallas Central Business District (CBD). This area is susceptible to frequent flooding, and is economically and socially depressed as a result of that flooding. Projects formulated to increase the level of flood protection for the CBD fail to provide any benefit to the downstream study area and, under certain conditions would increase flooding and flood damages in the downstream area. As concluded in the August 3, 2001, supplemental information paper, the appropriate sequence for constructing the projects is first construct the Dallas Floodway Extension project and then to raise the existing Dallas floodway East Levee.

6. *"Because this represents a return on investment that far exceeds every flood damage reduction option examined in the report, these upstream improvements probably should have been the central feature of a leading alternative."*

Selecting a project that has the greatest return on investment as suggested by the Office of Management and Budget (OMB) does not follow the Federal Principles and Guidelines (P&G). The P&G requires that a project be formulated to maximize net economic benefits consistent with protecting the Nation's environment. The "Chain of Wetlands," with net annual benefits of about \$6.6 million, has greater net economic benefits than the Dallas Floodway East Levee raise suggested by the OMB. That project is likely to have net annual benefits of only about \$5.3 million. Thus, the "Chain of Wetlands" not upstream East Levee was the "central feature" of the Dallas Floodway Extension project.

7. *"According to the Corps' supplemental paper, the benefit-to-cost ratio for the flood control plan recommended in the report would drop to about 1.14, once the raising of the east levee to protect downtown Dallas is considered. However, this is a composite ratio for all of the project's flood control features and, as such, gives a false sense of the plan's economic justification. The 1.14 ratio does not suggest that the Corps has sized or placed each of the features appropriately, nor does it demonstrate that they are justified incrementally. Indeed, the "chain of wetlands" may be the only feature whose flood damage reduction benefits would continue to exceed the costs."*

Except for the increase in height of the Cadillac Heights levee from a 100-year to a Standard Project Flood level of protection, the Corps report clearly shows that each of the elements of the Dallas Floodway Extension project is incrementally justified. It was not the intent of the August 3, 2001, supplemental information paper to provide a completely new incremental analysis based on the Office of Management and Budget's proposal to first raise the height of the Dallas Floodway East Levee by about 2 feet. Rather, the supplemental paper shows that the proper evaluation and construction sequence is to first construct the Dallas Floodway Extension project and then raise the Dallas Floodway East Levee.

## Point-by-Point Response (Continued)

8. *"Thus, the Corps has not identified the option with the greatest net economic benefits consistent with protecting the Nation's environment..."*

Contrary to the Office of Management and Budget (OMB) assertion, the Army Corps of Engineers properly followed the Principles and Guidelines (P&G), and did identify the National Economic Development (NED) plan. The plan with the greatest net annual benefits is a 1,200-foot-wide swale along the Trinity River. Raising the Dallas Floodway East Levee does not provide greater net benefits than the 1,200-foot wide swale plan. To satisfy other National planning objectives of minimizing adverse environmental impacts and providing for ecosystem restoration, and after much input from the citizens of the city of Dallas, the Corps deviated from the NED plan and developed the "Chain of Wetlands" plan. Except for the increment to raise the levee protecting the Cadillac Heights area from the 100-year to the Standard Project Flood level of protection, all project features are incrementally justified. Such improvements in a project is permissible under the P&G which allows for factors other than just economics to be considered in the formulation of a project. Achieving public acceptability, providing for social justice, avoiding or minimizing adverse environmental impacts, minimizing induced flooding, and restoring natural habitats are important considerations.

9. *"According to the report, the proposed Cadillac Heights levee would yield a net negative economic return, by increasing the overall flood damage in the city from a very large storm."*

In order to minimize adverse project effects, maintain community cohesion, not induce flooding and worsen economic conditions in the Cadillac Heights neighborhood, and to provide for an acceptable level of flood protection, the Cadillac Heights levee was designed to provide a greater level of flood protection (SPF) than is economically justified (100-year protection). The SPF level of protection was authorized by the Congress in 1965. Raising the height of the Cadillac Heights levee did not increase flood damages in the Dallas Central Business District (CBD). Raising the Cadillac Heights levee did, however, reduce the increase in benefits to the CBD that would have occurred if floodwaters were allowed to flood the Cadillac Heights neighborhood. Channel and levee projects often induce flooding and damages in other areas, and these types of tradeoffs are necessary to develop an overall flood damage reduction project for a community. From an overall project perspective, the Dallas Floodway Extension project still provides approximately \$6.6 million in average annual benefits to the Dallas CBD. In other words, with implementation of the authorized Dallas Floodway Extension project, the restored level of protection to the CBD is greater than the level of protection currently provided to this area by the existing Dallas Floodway levees.

10. *"...the Corps should have considered a broader range of alternatives, such as the option of purchasing [homes], on a willing seller basis..."*

## Point-by-Point Response (Continued)

Contrary to the Office of Management and Budget (OMB) assertion, the Corps did consider a broad range of alternatives for the Cadillac Heights area, including nonstructural measures. However, the Corps did not limit its consideration to only residential properties, but also evaluated the removal of commercial properties located in the Cadillac Heights neighborhood. Unfortunately, except for about 8 of the 294 structures in the Cadillac Heights neighborhood, buyouts are not economically justified. This includes the voluntary buyout of homes as proposed by OMB. The attached information paper on the "Reevaluation of the Cadillac Heights Floodplain Evacuation Measures" provides additional documentation on the Corps evaluation of the removal of flood prone properties from the Cadillac Heights neighborhood.

11. *"We disagree with the report's recommendation to award the city a \$23 million credit for past work on two local levees."*

Providing credit to the city of Dallas for constructing levees that are integral to and necessary for the construction of the Dallas floodway Extension project is in accordance with Section 351 of the Water Resources Development Act of 1996. Both the Central Wastewater Treatment Plant levee, and that portion of the Rochester Park levee that is a continuation of Lamar Street levee, are required to provide economically justified flood protection to the area downstream of the Dallas Central Business District. Studies clearly show that the Central Waster Water Treatment Plant levee is economically justified, while a portion of the Rochester Park levee is a required segment of the economically justified Lamar Street levee. Credit is not recommended for that portion of the Rochester Park levee that was not needed.